

Patent claims

1. Method for curing coils (16) which have been produced by a winding method, a coil (16) being
5 arranged in an oven (12) for curing, the coil (16) being heated up to a predeterminable temperature, and the coil (16) being rotated about its longitudinal axis (32) to avoid dripping of resin, characterized in that the conductor or conductors
10 of the coil (16) is or are flowed through by current, in particular by direct current, and is or are heated in this way.
2. Method according to Claim 1, characterized in that
15 the coil (16) is rotated forward and back in a predeterminable sequence of rotational movements about its longitudinal axis (32).
3. Method according to Claim 1 or 2, characterized in
20 that the predeterminable temperature is changed by a control device (24) in accordance with a previously chosen temperature profile.
4. Method according to one of the preceding claims,
25 characterized in that, in a rotational movement in a direction about the longitudinal axis (32) up to its reversal point (42, 48, 54, 58, 60, 62) of the next-following change of direction, the coil (16) is rotated by an angle unequal to 360° or unequal
30 to an integral multiple thereof.
5. Method according to Claim 4, characterized in that,
after the next change of direction has taken place, the coil (16) is rotated by an angular amount of
35 360° or an integral multiple thereof in an opposite direction as far as the then-following further reversal point (42, 48, 54, 58, 60, 62).

6. Method according to Claim 5, characterized in that, after a predetermined number of rotations forward and back, the angle is changed once by twice the angular difference, that is to say the angle less
5 360° or an integral multiple thereof, with the result that the subsequent reversal point lies on the opposite side of a 360° location by an angular difference.
- 10 7. Method according to one of the preceding claims, characterized in that, after reaching a specific terminating criterion, in particular after a specific time, on account of a specific degree of
15 hardness of the insulation or on account of the reaching of a specific characteristic value of a substance, the movement forward and back is ended.
8. Arrangement for curing coils (16) which have been produced by the winding method, with an oven (12)
20 for receiving the coil (16), with a rotating device (22) for receiving and rotating a coil (16) arranged in the rotating device (22), with a heating device for heating the coil (16) and with a control device (24) for controlling the heating
25 operations and possibly the rotating operations, characterized in that the conductor or conductors of the coil (16) is or are connected to the heating device, and in that the conductor or conductors are flowed through by current for heating the coil
30 (16).
9. Arrangement according to Claim 8, characterized in that the rotating device (22) has a slip ring, by means of which current can be transferred from the
35 heating device to the coil (16).

10. Arrangement according to Claim 8, characterized in that the coil (16) is connected to the heating device by means of cables (26).
- 5 11. Arrangement according to Claim 8, characterized in that the coil (16) can be rotated forward and back about the longitudinal axis (32) with the rotating device (22).
- 10 12. Arrangement according to one of Claims 8 to 11, characterized in that a controller (24), by means of which the rotational movements of the coil (16) in particular can be controlled, is provided.
- 15 13. Arrangement according to Claim 12, characterized in that the controller is contained in the control device (24).